

V&V Reference Report

L2 ASCDS Version : 10

Observation 15780 - L2 Version 3
Chandra X-Ray Center

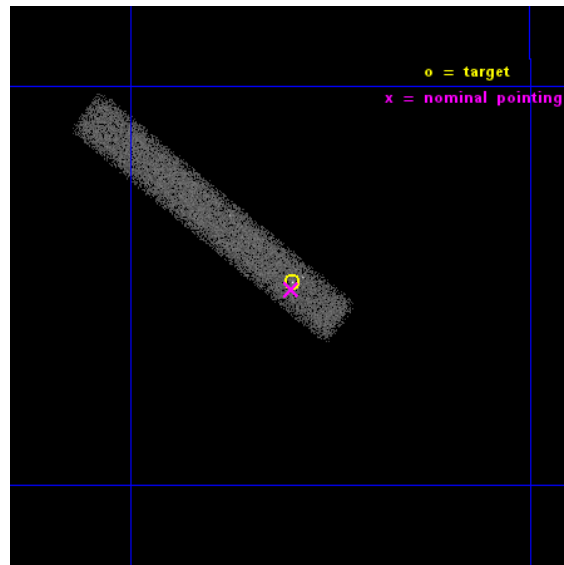
L2 Processing Date : Dec 6 2014

Contents

1	Front	2
2	OBI	3
2.1	OBI	3
2.1.1	Images	3
2.1.2	Bias	3
2.1.3	Parameters	4
2.1.4	Events	4
2.2	Compared Parameters	5
2.3	Aspect	6
2.4	Star Slots	9
2.4.1	Slot 3	9
2.4.2	Slot 4	10
2.4.3	Slot 5	11
2.4.4	Slot 6	12
2.4.5	Slot 7	13
2.5	FID Slots	14
2.5.1	Slot 0	14
2.5.2	Slot 1	15
2.5.3	Slot 2	16
A	Summary	17
A.1	Status	17
A.2	Comments	17

1 Front

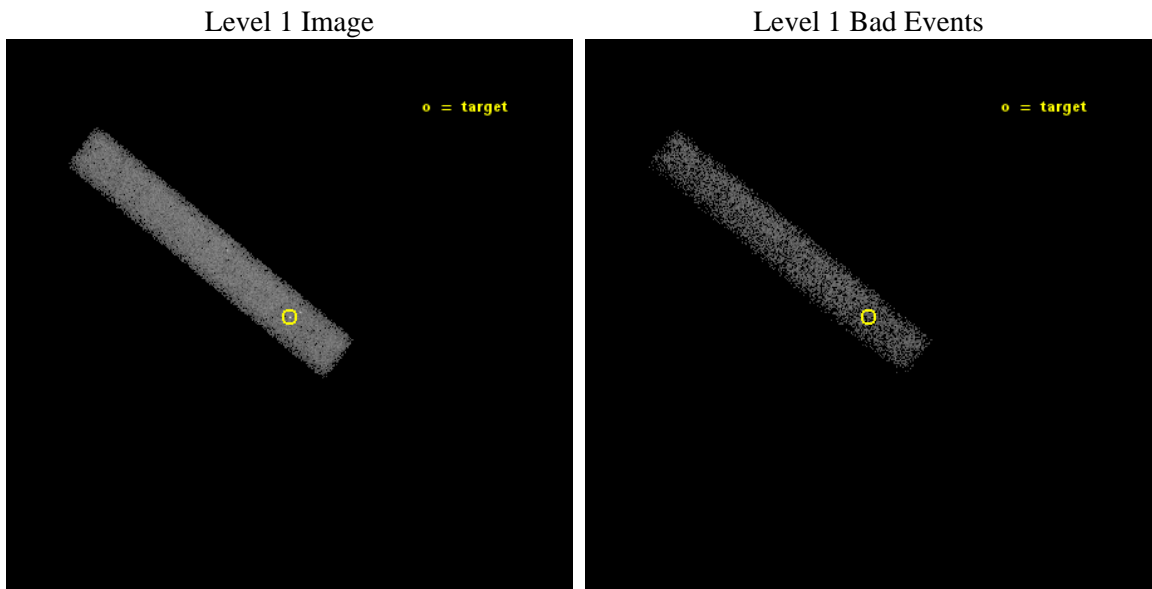
seq_num	401577	Sequence number
obs_id	15780	Observation id
title	X-ray pulsars at very low mass accretion rates	Proposal title
observer	Dr Pablo Reig	Principal investigator
object	SAX J2103.5+4545	Source name
dtycycle	0	
cycle	P	events from which exps? Prim/Second/Both
ra_targ	315.89875	Observer's specified target RA [deg]
dec_targ	45.751528	Observer's specified target Dec [deg]
ra_nom	315.89922142563	Nominal RA [deg]
dec_nom	45.748522377257	Nominal Dec [deg]
roll_nom	218.66640960061	Nominal Roll [deg]
revision	3	Processing version of data
ontime	50069.018561482	Sum of GTIs [s]
livetime	45409.956975769	Livetime [s]
ontime7	50069.018561482	Sum of GTIs [s]
l2events	22015	Number of level 2 events



2 OBI

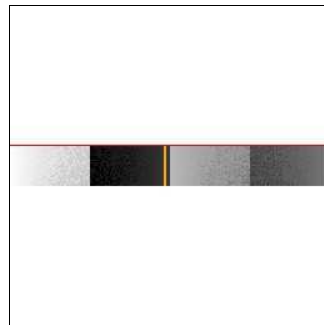
2.1 OBI

2.1.1 Images



2.1.2 Bias

Chip 7



2.1.3 Parameters

obi_num	0	Obi number	sched_exp_time	50000.000000	[s] Scheduled observation exposure time
ascdsver	10.3.1	Processing system revision	ontime	50069.018561482	Sum of GTIs [s]
caldbver	4.6.4	 	ontime7	50069.018561482	Sum of GTIs [s]
date	2014-12-06T16:07:49	Date and time of file creation	l1events	45101	Number of level 1 events
revision	3	Processing version of data			

2.1.4 Events

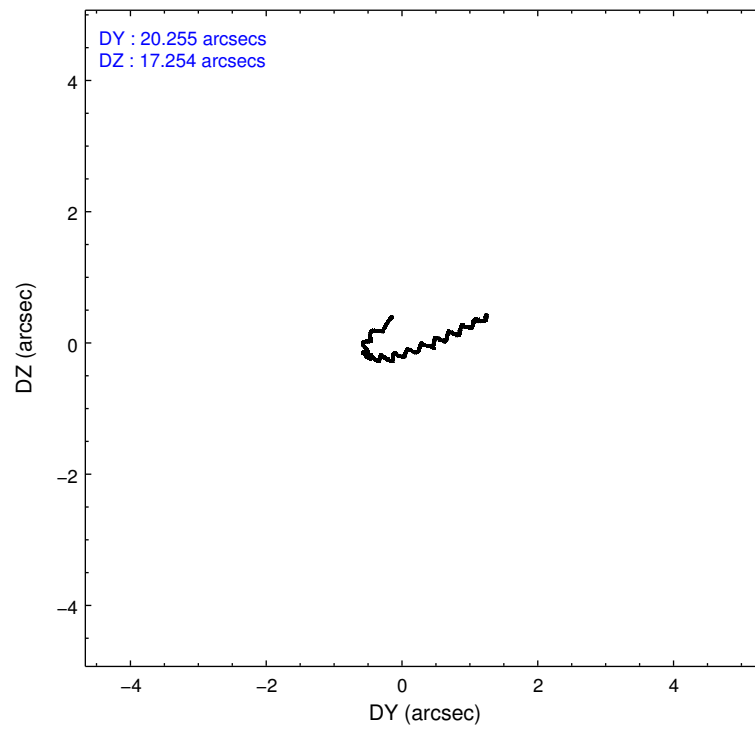
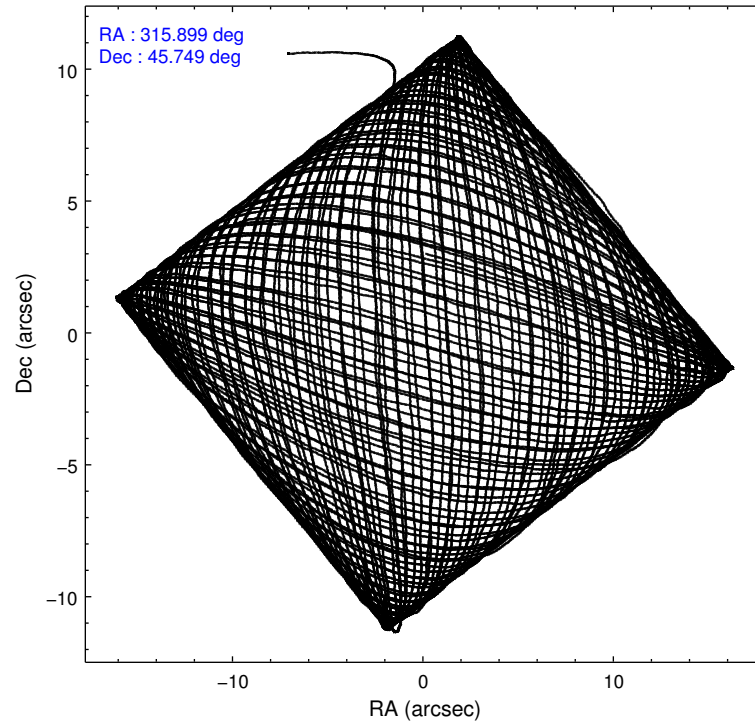
	ccd 7
level 1 events	45101
rejected events	22196
rejected %	49%

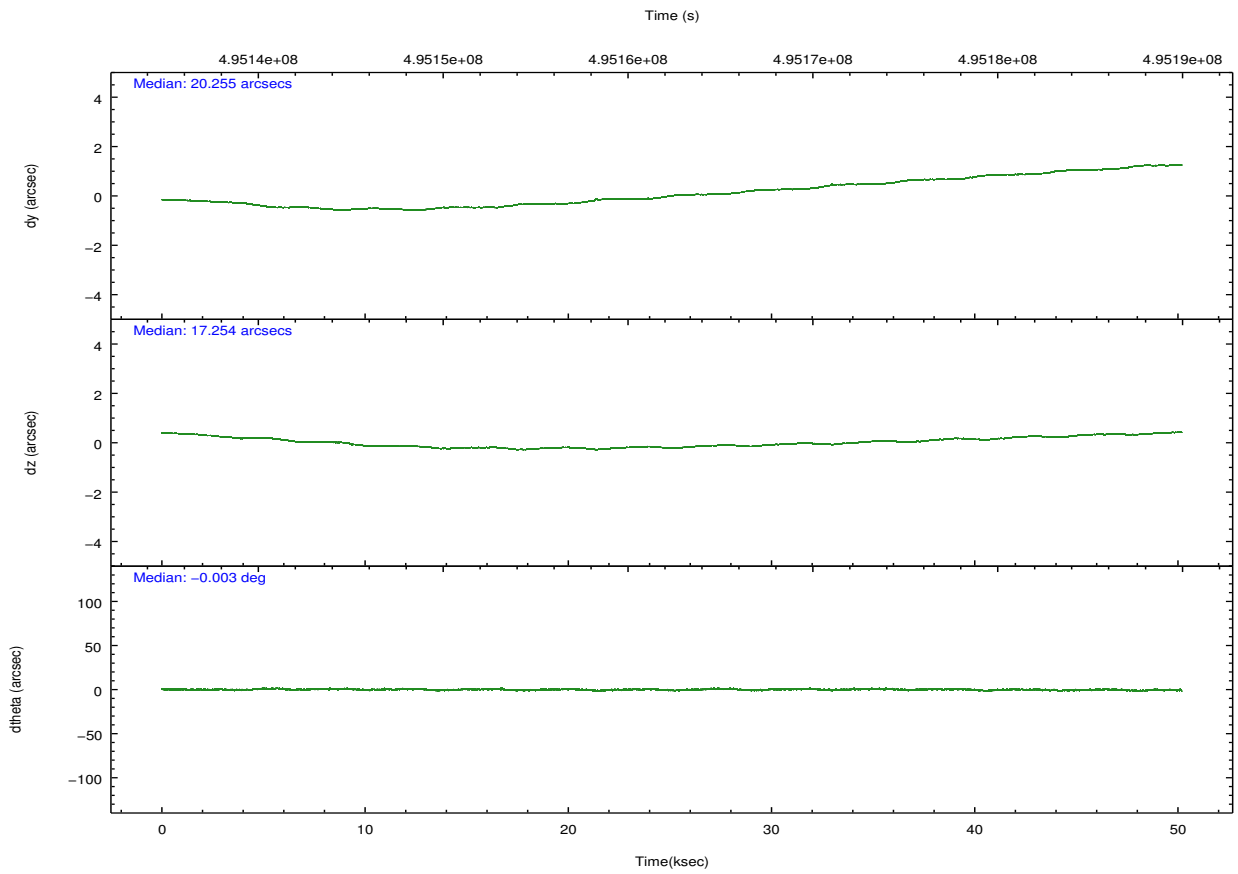
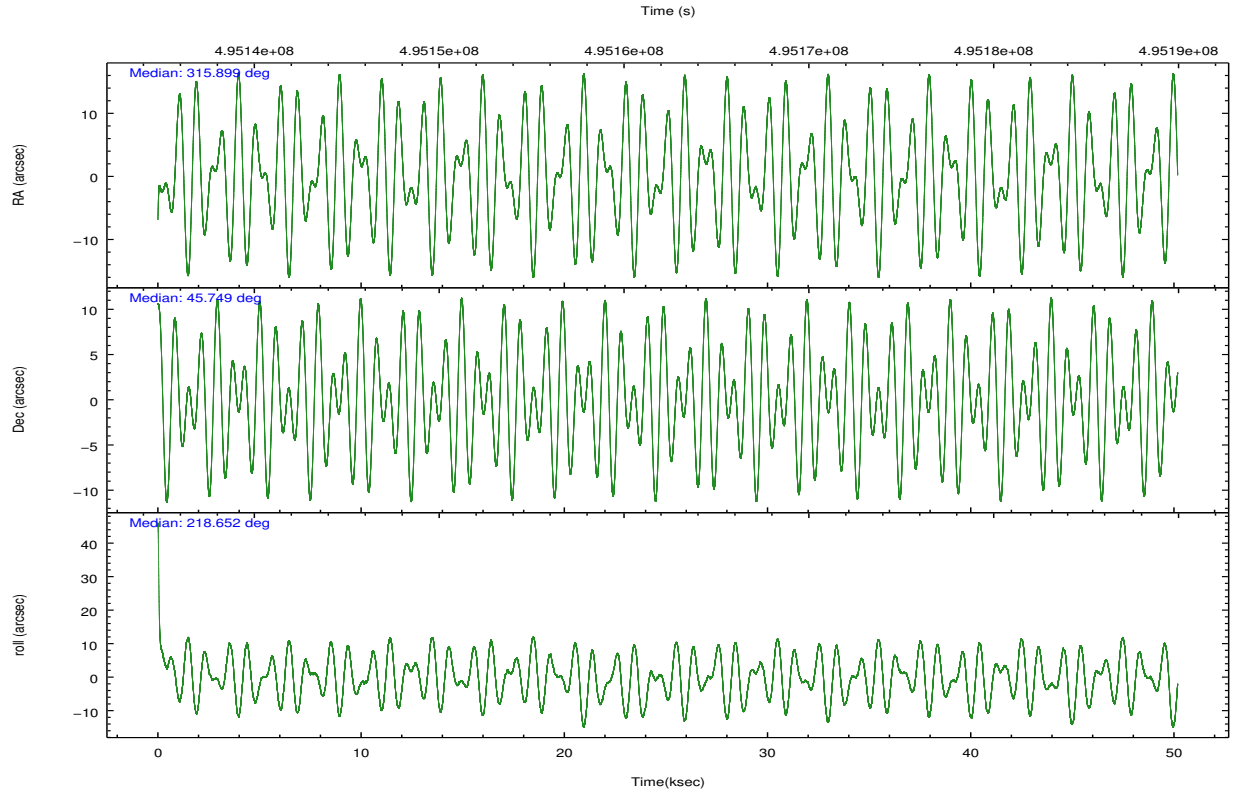
	ccd 7
grade 0 events	2556
	5%
grade 1 events	87
	0%
grade 2 events	4578
	10%
grade 3 events	2955
	6%
grade 4 events	2895
	6%
grade 5 events	4600
	10%
grade 6 events	9922
	21%
grade 7 events	17508
	38%

2.2 Compared Parameters

Parameter	Planned	Actual	Parameter	Planned	Actual
Instrument	ACIS	ACIS	Obspar format version number	7	7
Detector	ACIS-7	ACIS-7	Obspar file type	PREDICTED	ACTUAL
Grating	NONE	NONE	Obspar update status	NONE	UPDATED
Data mode	FAINT	FAINT	Number of optional ACIS chips dropped	0	0
Observation mode	POINTING	POINTING	On-chip summing requested	N	N
[deg] Pointing RA	315.912971	315.8992214256323	Subarray requested	CUSTOM	1/8
[deg] Pointing Dec	45.774124	45.74852237725687	Subarray start row	449	449
[deg] Pointing Roll	218.499922	218.6664096006062	Subarray row count	128	128
[mm] SIM focus pos	-0.684267	-0.6828225247311905	Alternating exposures requested	N	N
[mm] SIM defocus	0	0.001444936568705701	[s] Primary exposure time	0.000000	0.4
[mm] SIM translation stage pos	-190.132523	-190.1400660498719			
[mm] SIM translation stage offset	0	0.00754346686406393			
[s] Observation start time (MET)	495137464.184000	495136510.13312			
Observation start date	2013-09-09T18:09:57	2013-09-09T17:55:10			
[s] Observation end time (MET)	495187464.184000	495188339.26095			
Observation end date	2013-09-10T08:03:17	2013-09-10T08:18:59			
Read mode	TIMED	TIMED			

2.3 Aspect





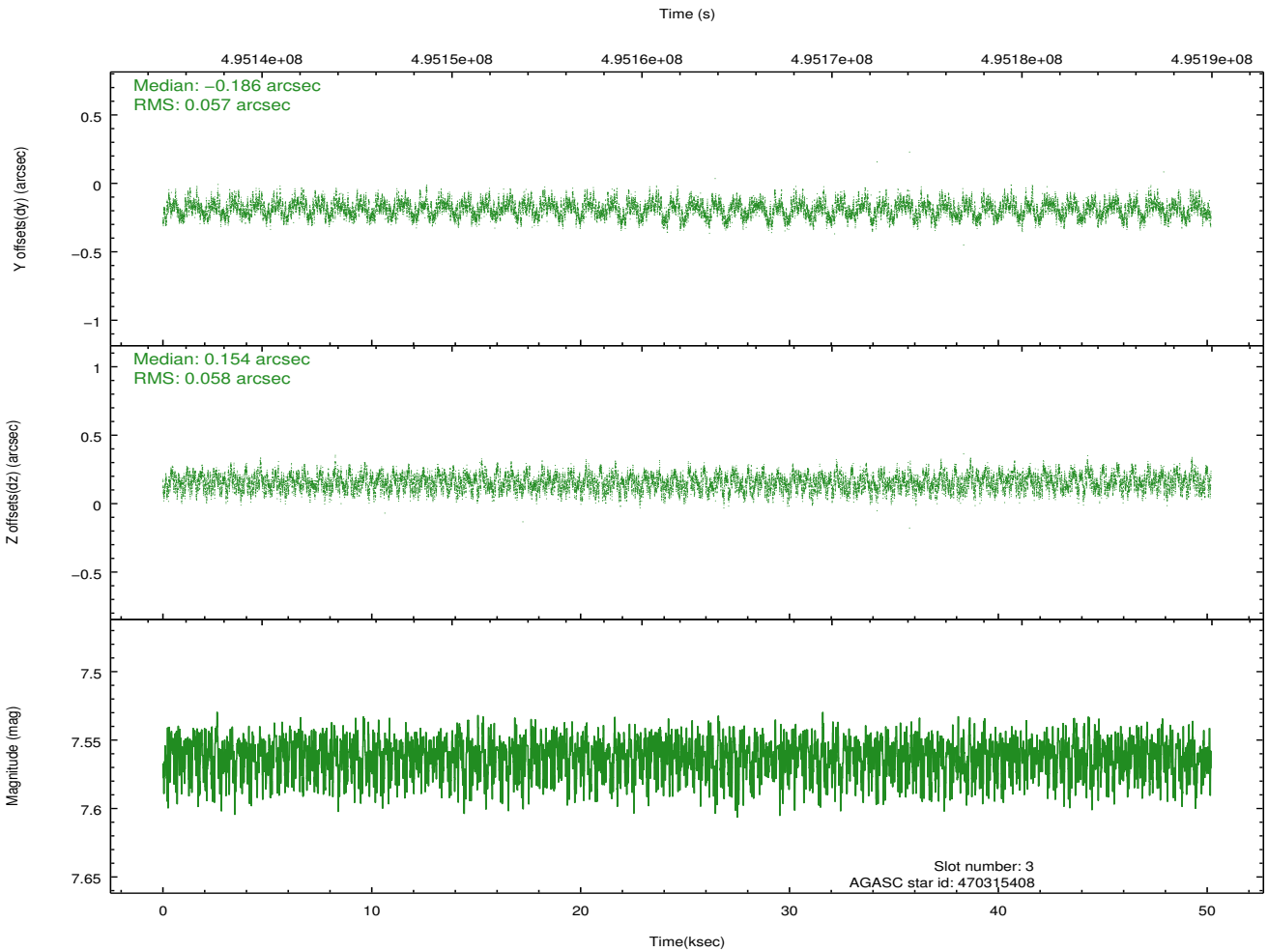
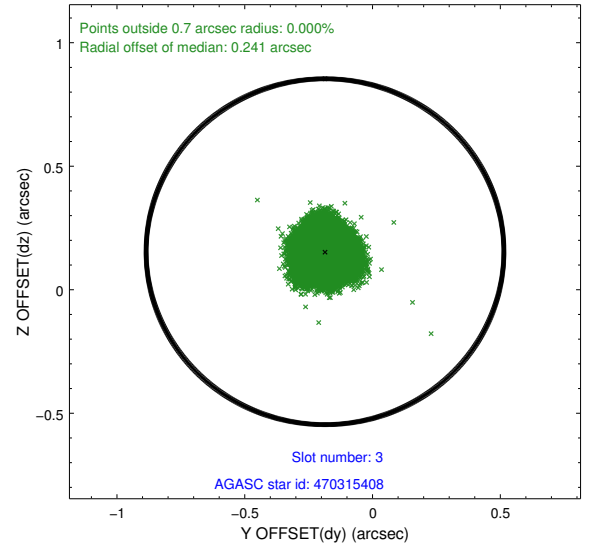
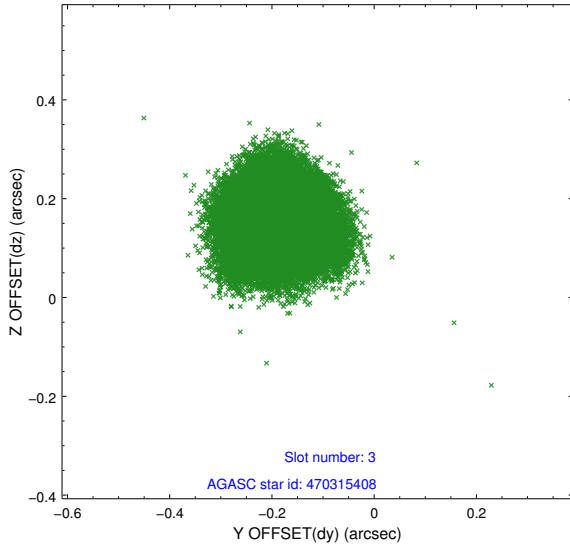
Slot Statistics

slot	status	used	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID		ACIS-S-2	6.95	12239	-0.112	-0.030	0.012	0.021	0.000000	0.000000	-773.65	-1738.73
1	FID		ACIS-S-4	7.04	12240	0.248	0.062	0.013	0.023	0.000000	0.000000	2140.02	169.81
2	FID		ACIS-S-5	7.07	12239	-0.167	-0.023	0.013	0.019	0.000000	0.000000	-1826.54	163.45
3	GUIDE	used	470315408	7.56	24475	-0.186	0.154	0.090	0.132	315.669796	45.884771	223.60	-689.91
4	GUIDE	used	470364224	9.08	24445	0.292	0.082	0.101	0.170	315.754029	46.033471	-269.50	-978.49
5	GUIDE	used	470381320	8.14	24476	-0.105	-0.325	0.067	0.105	316.040529	45.156229	1131.24	1942.00
6	GUIDE	used	470383240	7.05	24477	0.087	0.090	0.101	0.157	315.702579	45.848891	245.84	-539.57
7	GUIDE	used	470303880	8.70	24465	-0.091	-0.007	0.078	0.126	314.999963	45.509926	2387.28	-699.41

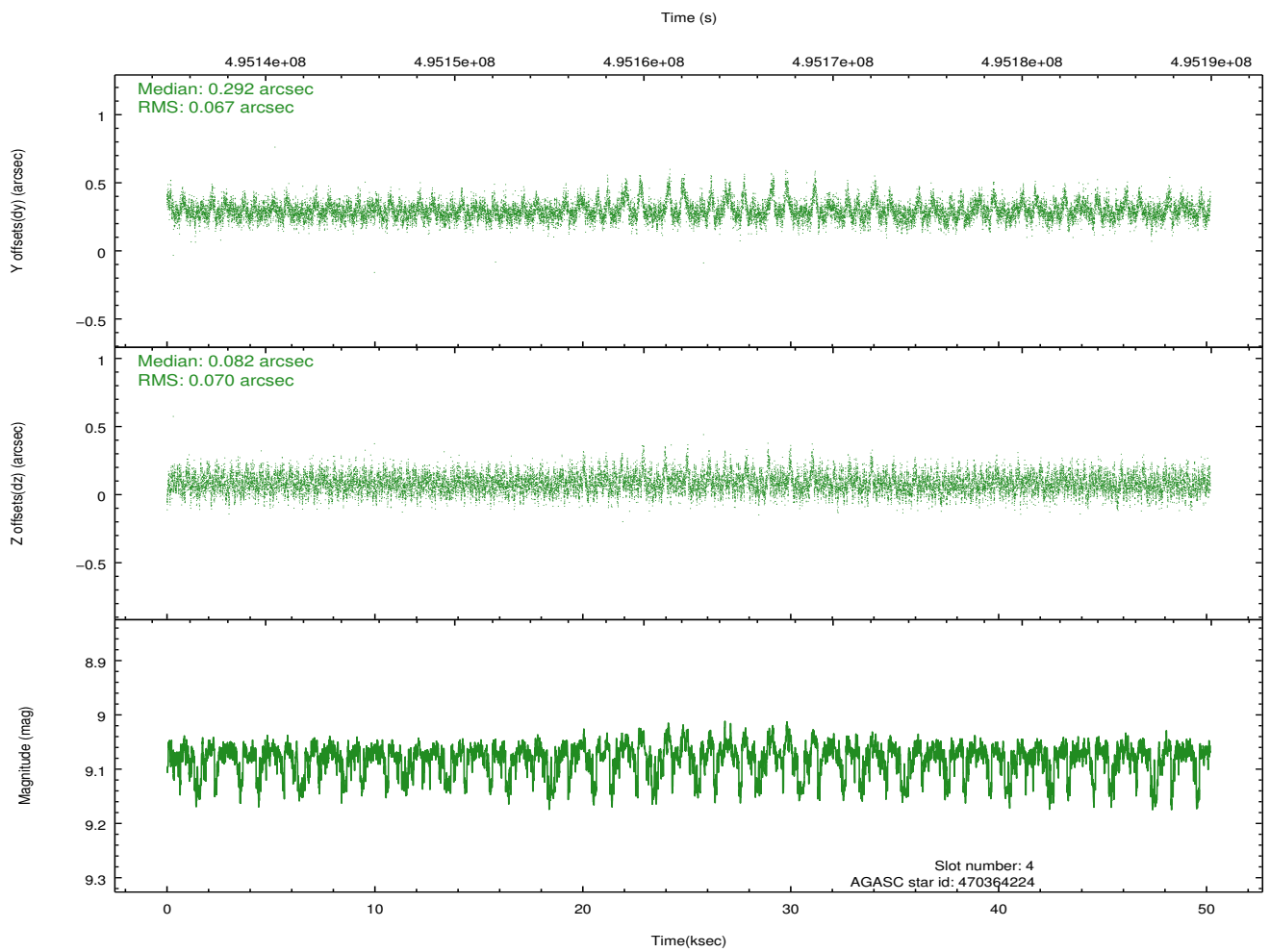
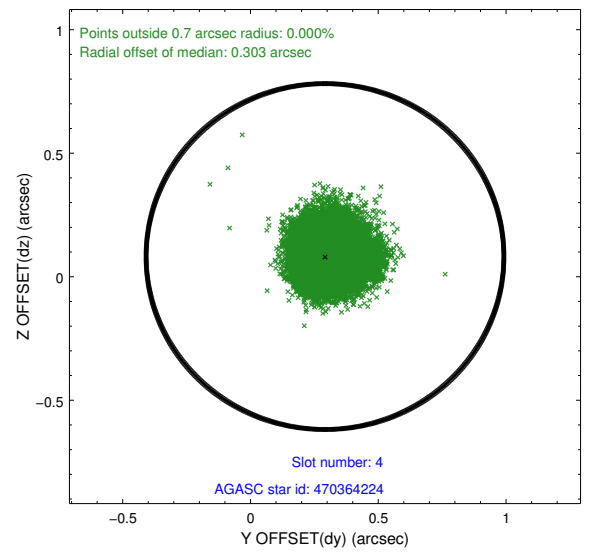
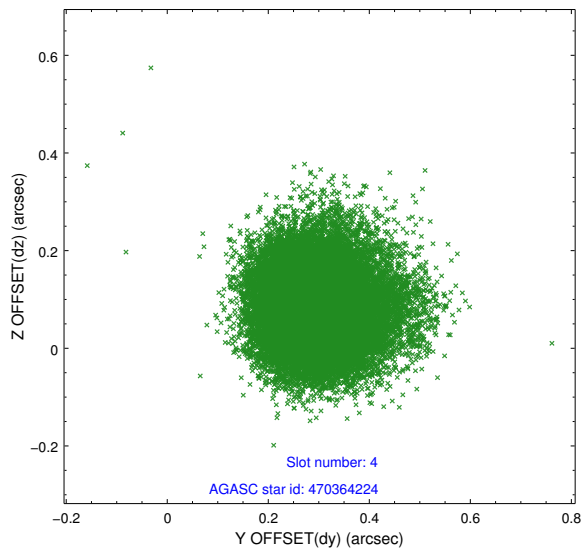
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2.4 Star Slots

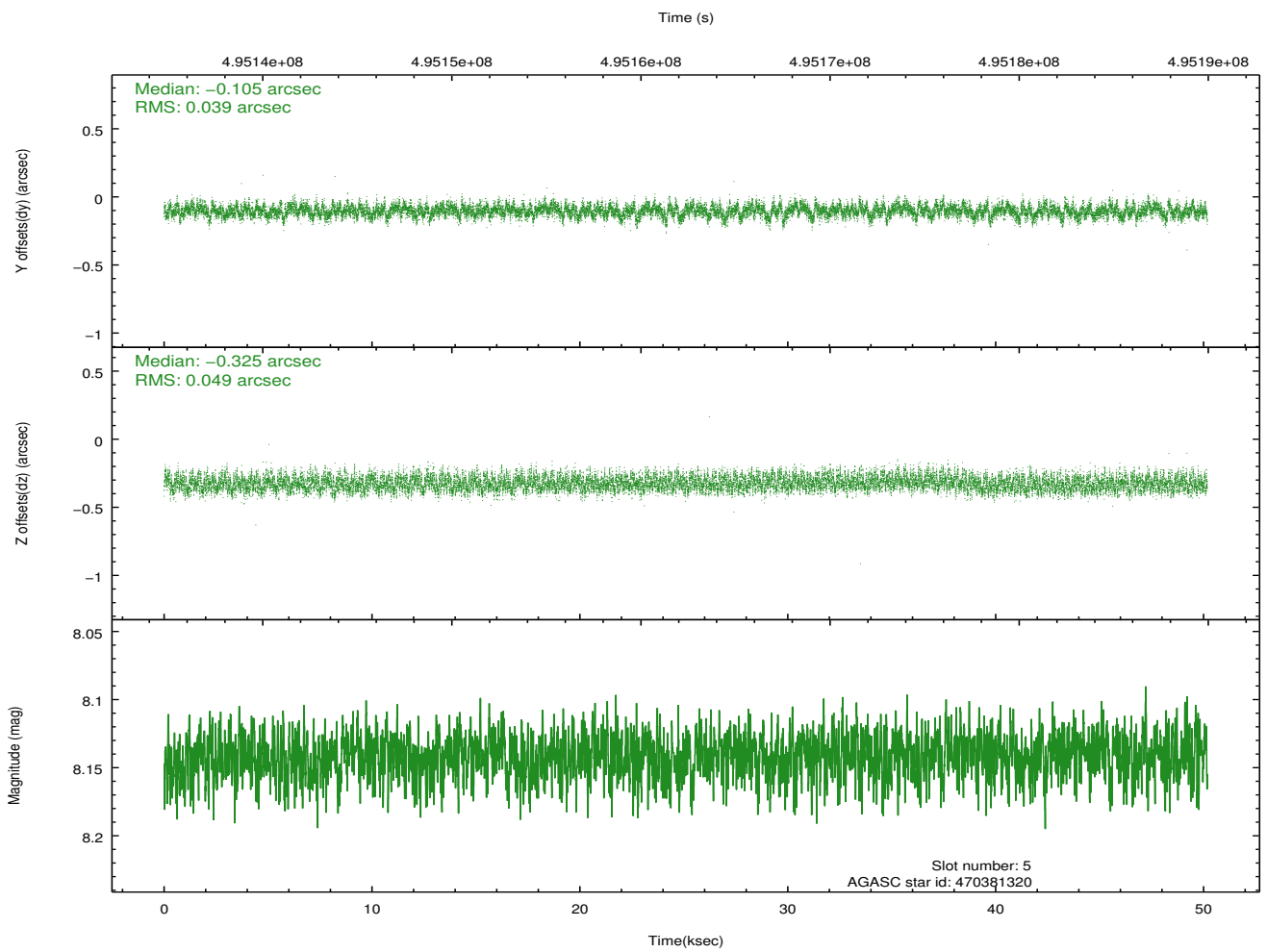
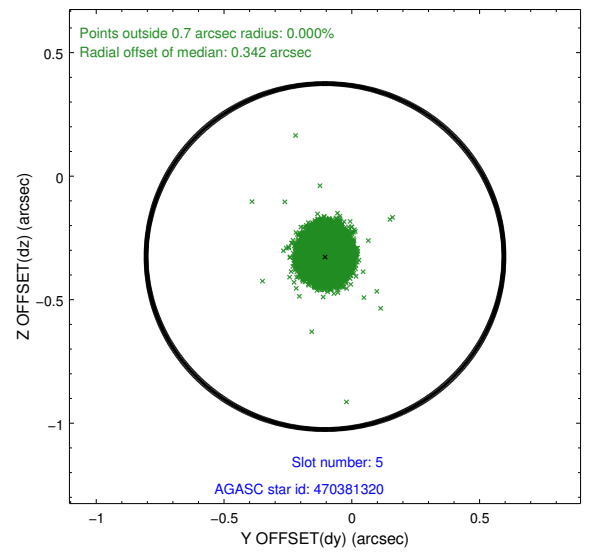
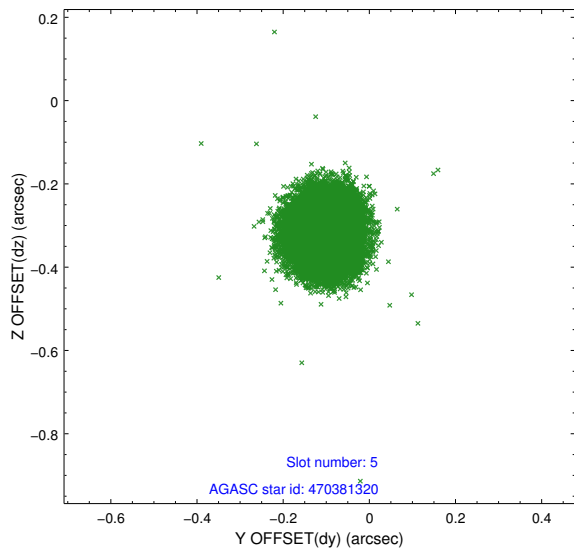
2.4.1 Slot 3



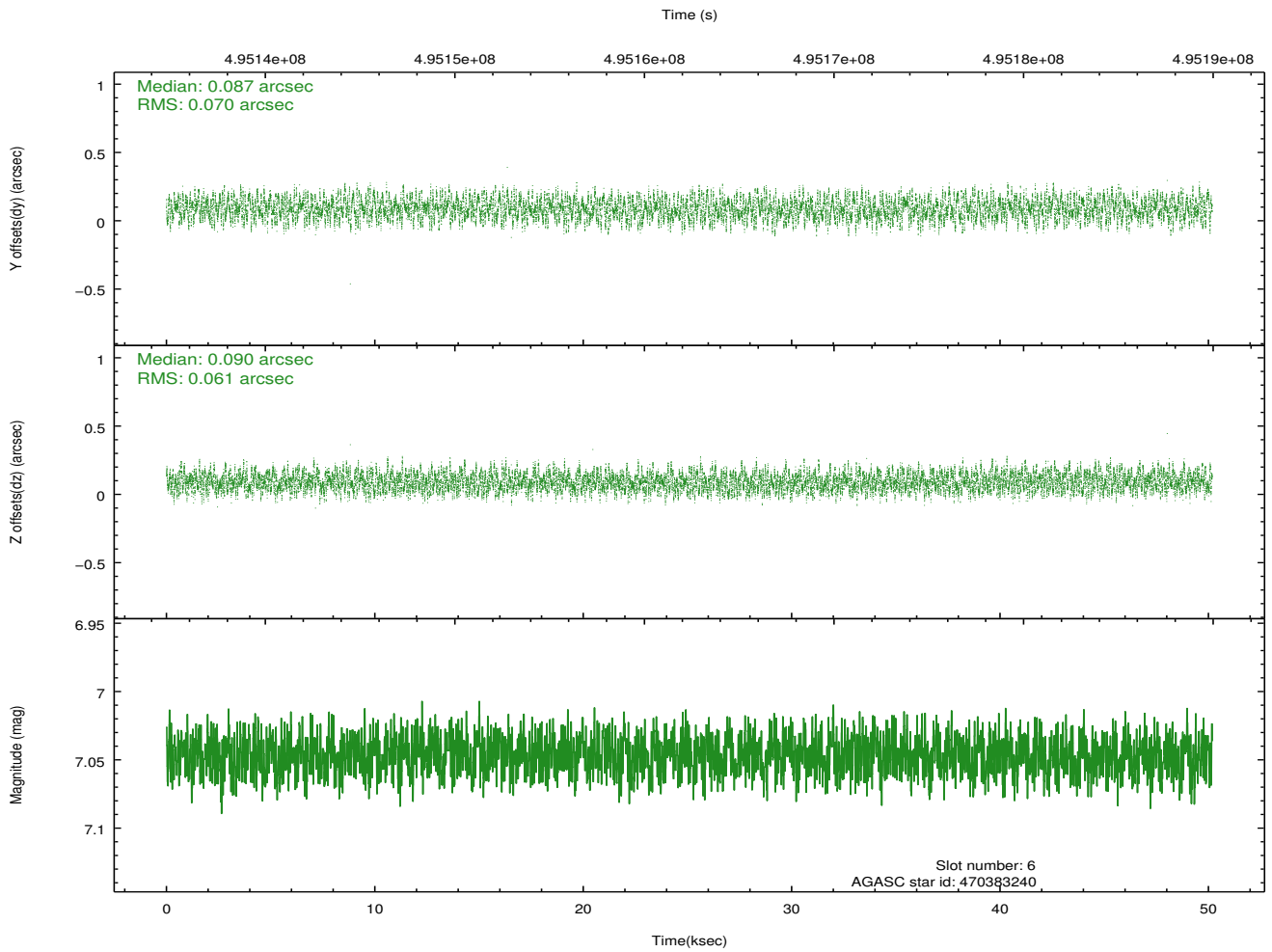
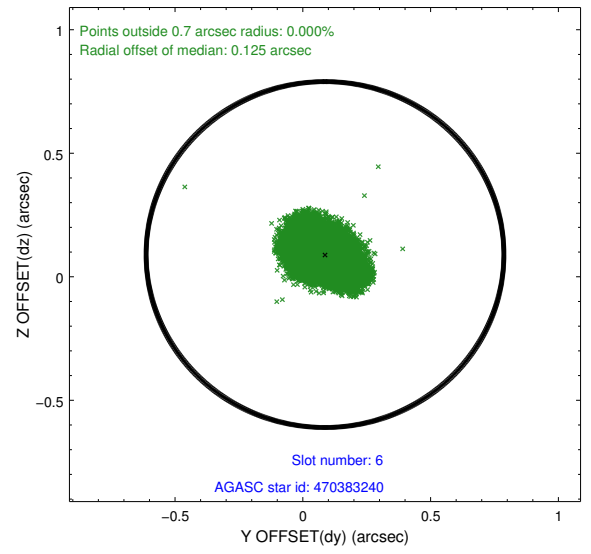
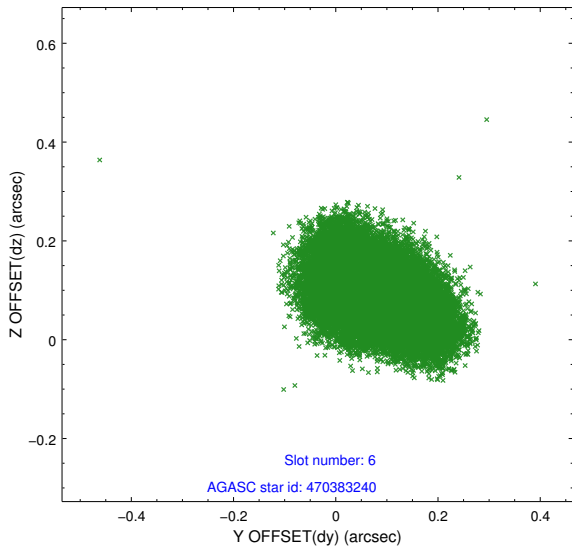
2.4.2 Slot 4



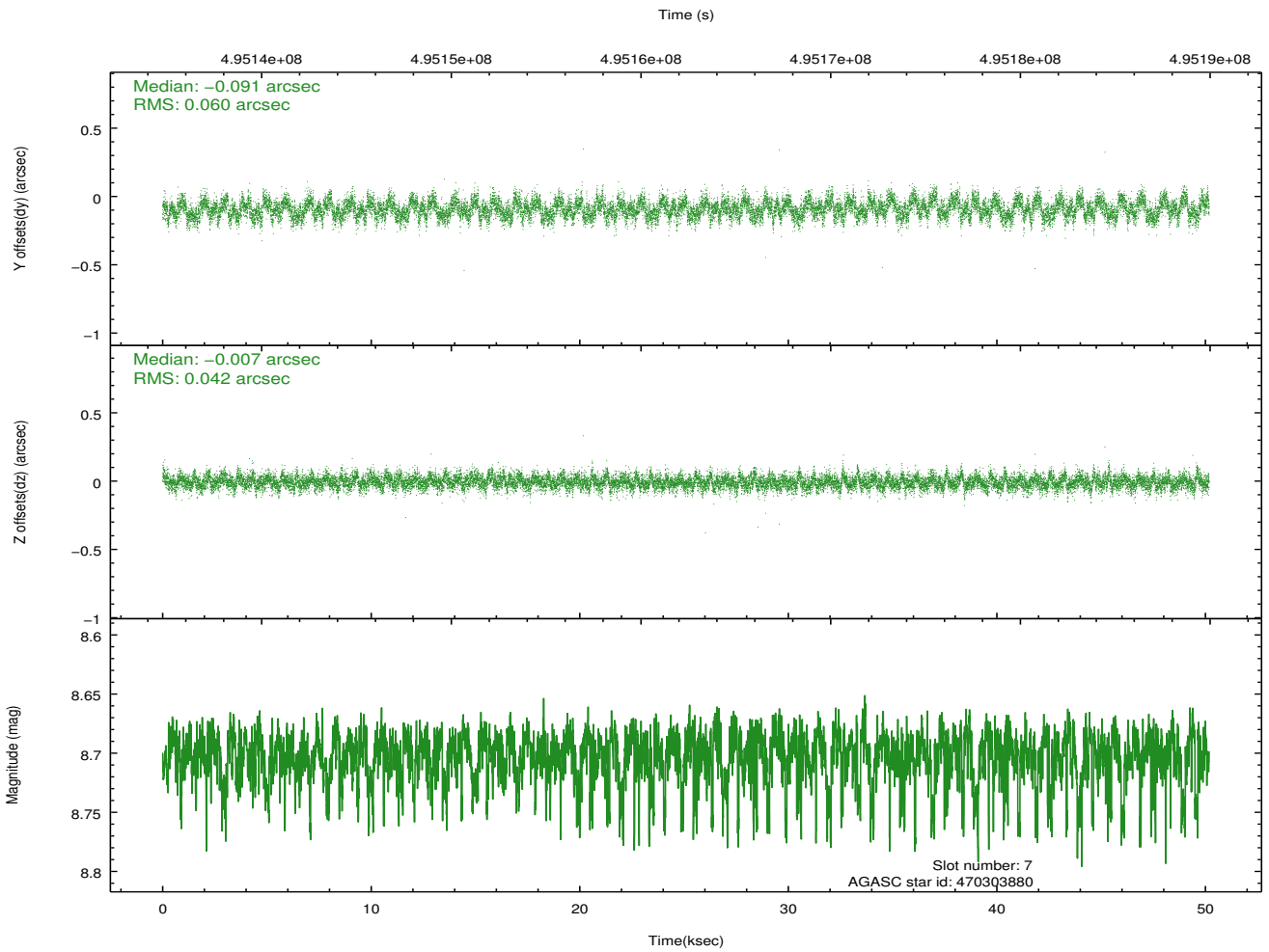
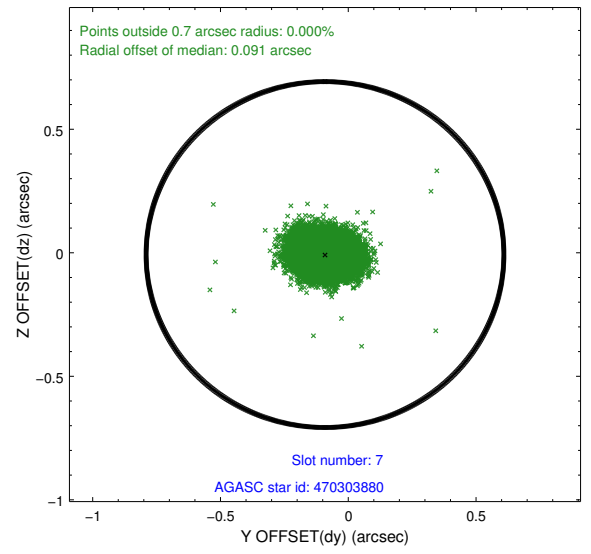
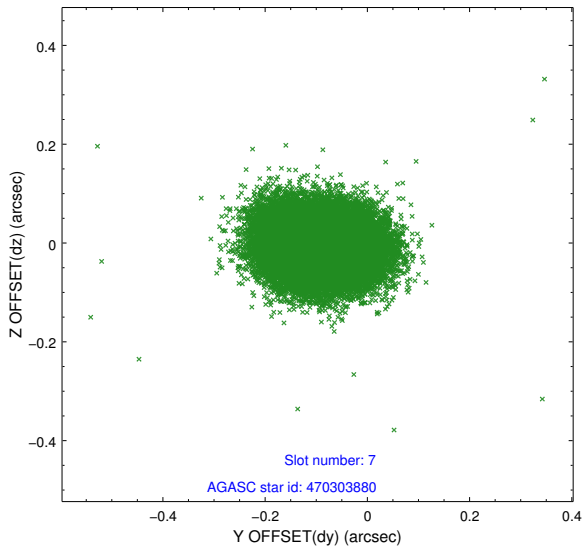
2.4.3 Slot 5



2.4.4 Slot 6

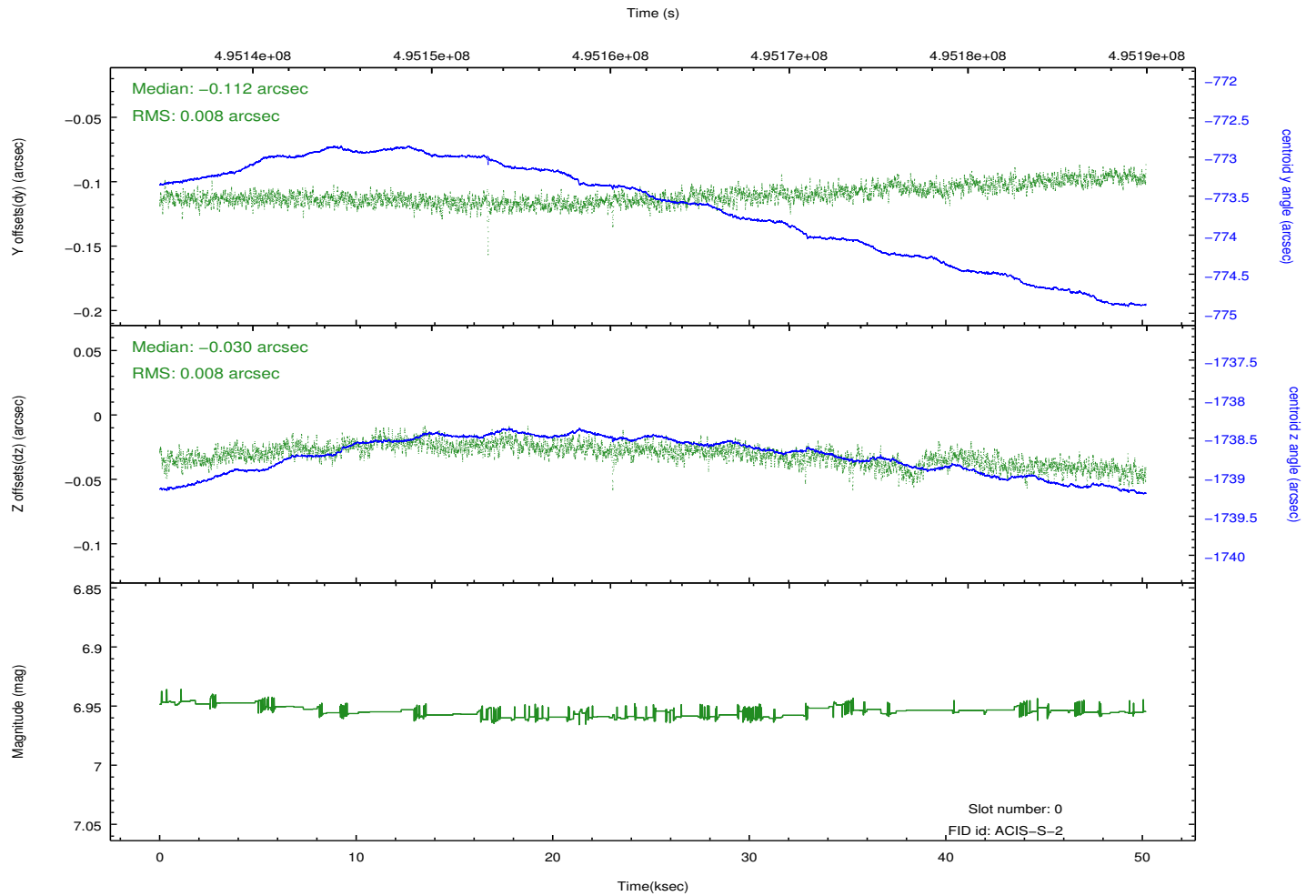
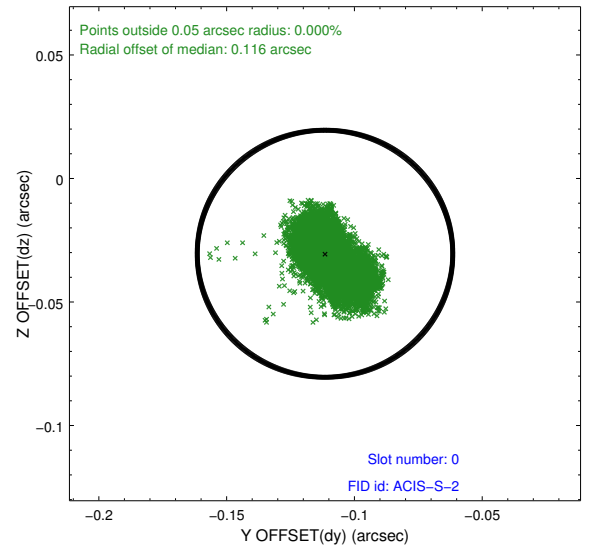
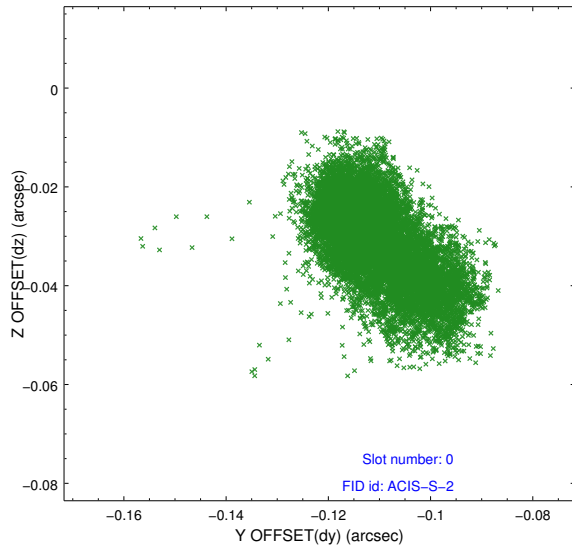


2.4.5 Slot 7

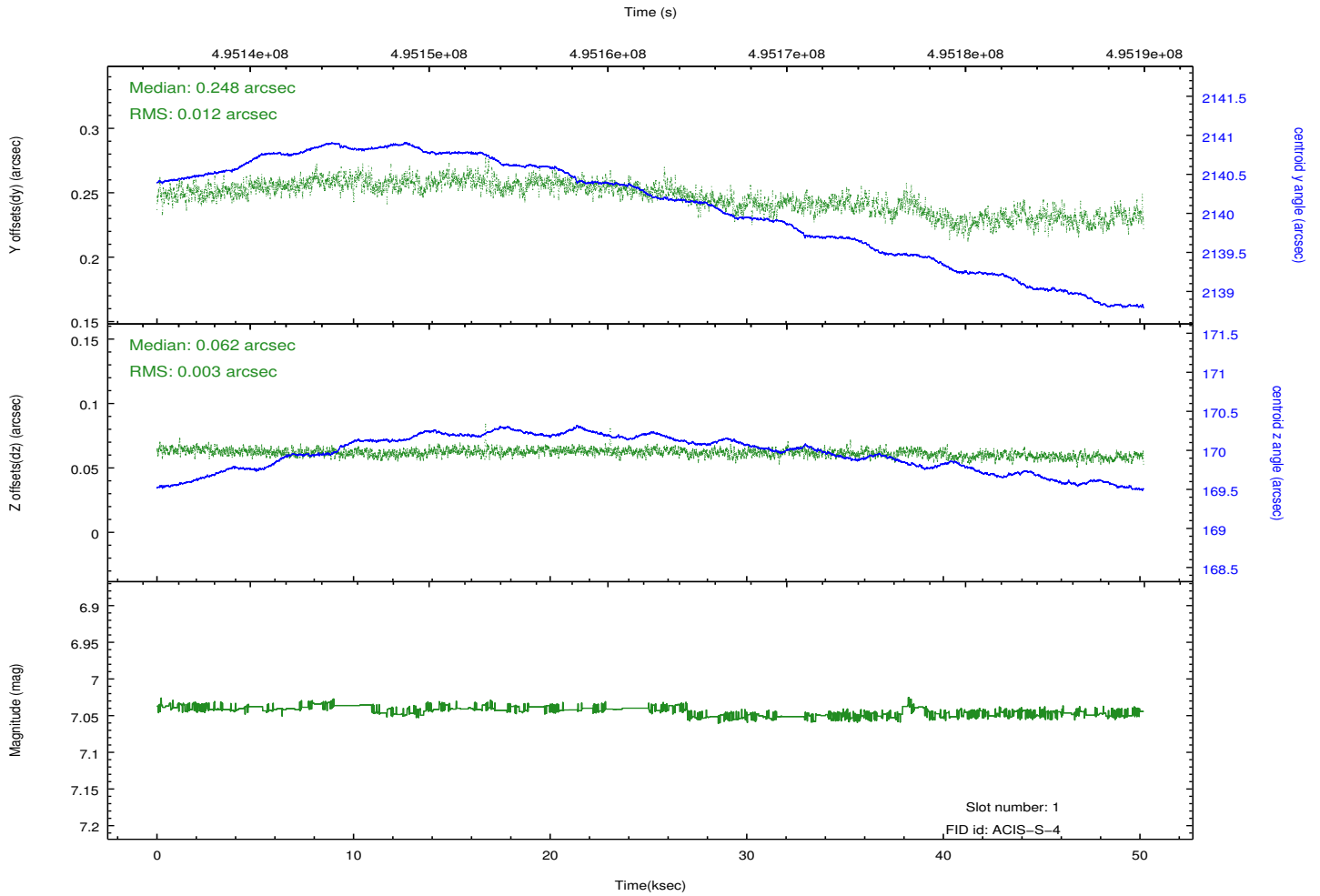
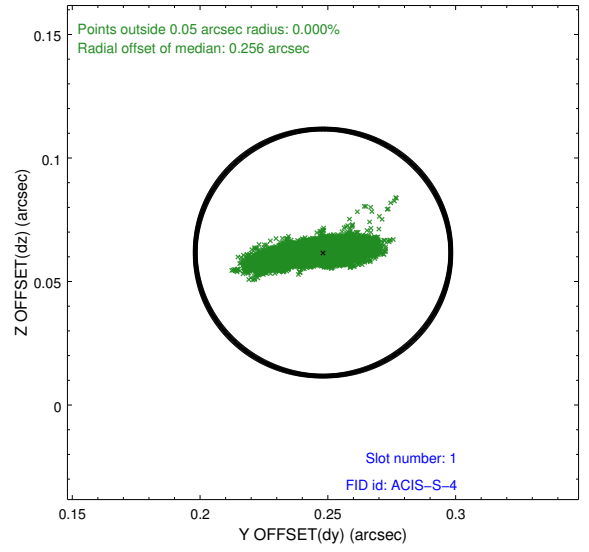
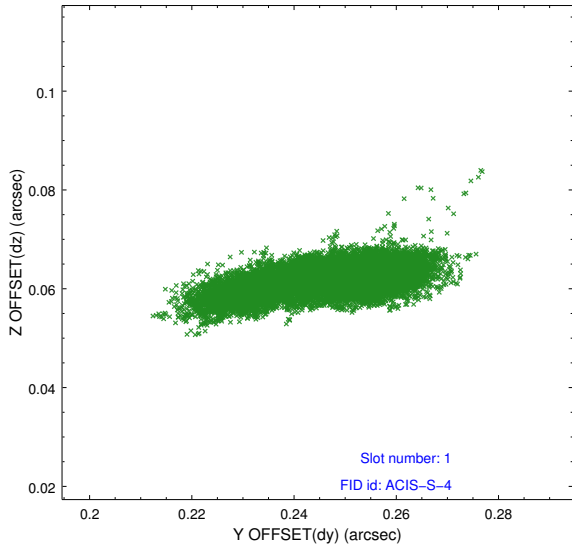


2.5 FID Slots

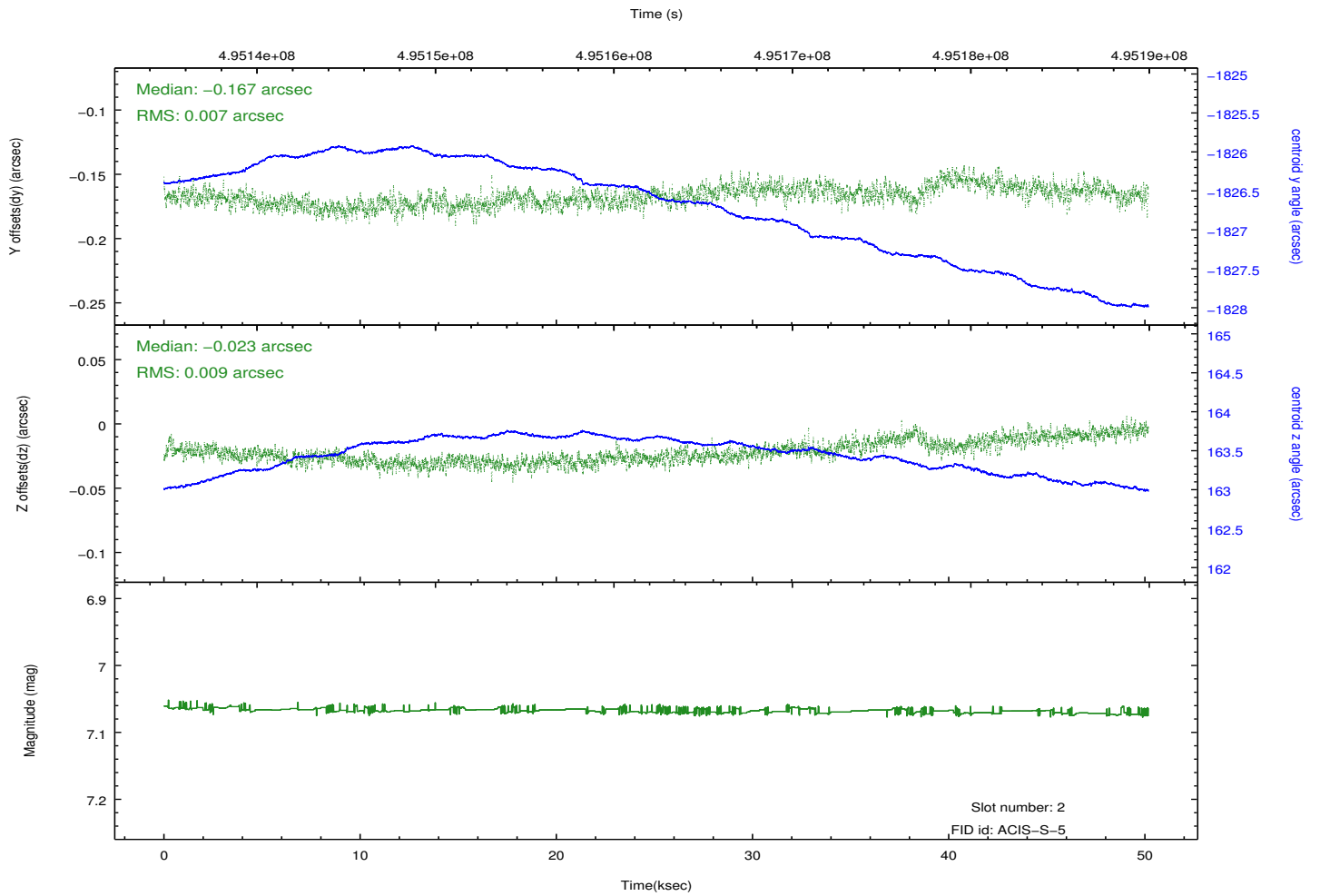
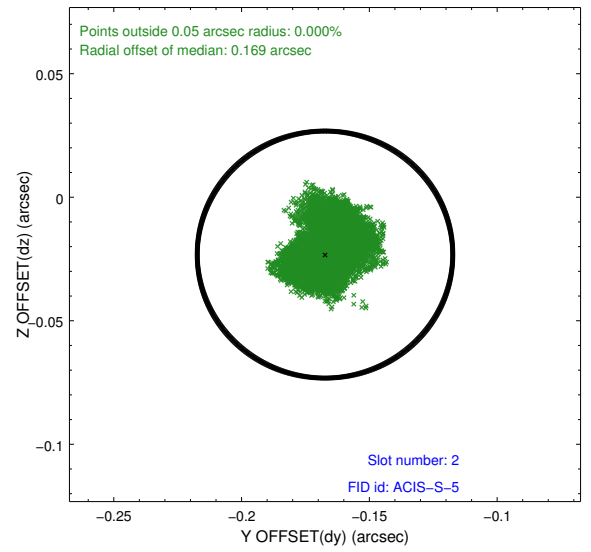
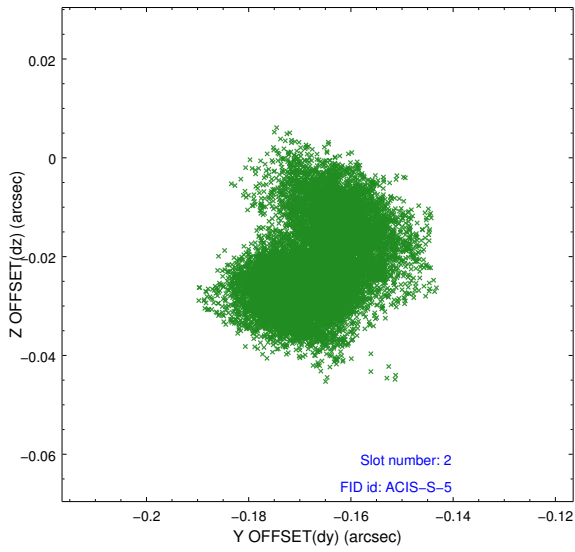
2.5.1 Slot 0



2.5.2 Slot 1



2.5.3 Slot 2



A Summary

A.1 Status

V&V Scientist	Beth Sundheim
V&V Date (YYYY-MM-DD)	2014.12.12
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	50.069018561482

A.2 Comments

These data have been reprocessed with new aspect alignment calibration files that correct small mean offsets (up to 0.4 arcsecs) and improve overall astrometric accuracy. The new calibration was determined using data from the time period being reprocessed and was performed using cross-correlation of X-ray sources with radio and optical counterparts.